

AMENDMENTS TO THE CLAIMS:

This listing of claims will replace all prior versions and listings of claims in the application:

1. (Currently Amended) A method of georeferencing a raster map, comprising:
 - displaying a first map in one area of a display, said first map being a digital raster map;
 - displaying a second map in a second area of the display, the second map being a georeferenced map that displays at least a portion of an identical geographic region displayed in the raster map;
 - receiving a first point on the first map;
 - receiving a corresponding first point on the second map;
 - receiving a second point on the first map;
 - receiving a corresponding second point on the second map;
 - ~~annotating a point on the first map;~~
 - ~~annotating a point on the second map, wherein the point annotated on the second map corresponds to the point annotated on the first map;~~
 - ~~assigning a geographic coordinate associated with the annotated point on the second map to the annotated point on the first map; and~~
 - ~~repeating annotating a point on the first map, annotating a point on the second map, and assigning a geographic coordinate at least a second time~~

receiving pixel coordinates for the first point on the first map and the second point on the first map;

receiving geographic coordinates for the first point on the second map and the second point on the second map; and

computing a georeferencing function for the first map in accordance with a relationship between the geographic coordinates.

2. (Currently Amended) The method of claim 1 further comprising receiving a verification that a point on the first map correctly matches geographically with a corresponding point on the second map ~~a point annotated on the first map is correctly associated with the corresponding point annotated on the second map.~~

3. (Previously Presented) The method of claim 1 wherein the first map is a portion of the second map.

4. (Currently Amended) The method of claim 1 further comprising ~~providing~~ assigning a longitude and latitude ~~to the~~ for at least one of the first point and the second point on the second first map based upon the geographic coordinates read for at least one of the first point and the second point on the second map.

5. (Currently Amended) The method of claim 1 wherein ~~[[the]]~~ at least one of the first point and the second point on the second first map has a known longitude and latitude.

6. (Currently Amended) The method of claim 1 further comprising ~~generating a georeferencing function to output~~ assigning ~~[[a]] geographic coordinate coordinates for each successive point annotated to an additional point received on the~~ first map using the computed georeferencing function.

7. (Canceled)

8. (Currently Amended) The method of claim 1 further comprising receiving an additional point on the first map ~~a mark on a~~ and automatically marking a corresponding additional point on the first second map as calculated by the computed georeferencing function, ~~the point on the first map being automatically annotated on the second map.~~

9. (Currently Amended) The method of claim 8 further comprising receiving a correction of the additional point marked on the second map.

10. (Currently Amended) The method of claim 1 ~~further comprising~~ selecting a wherein an approximate georeferencing function is predefined

~~georeferencing function to associate a point on the first map with a point on the second map.~~

11. (Currently Amended) A computer readable medium containing instructions executable by a computer to perform a method for georeferencing a raster map, the method comprising:

displaying a first map in one area of a display, said first map being a digital raster map;

displaying a second map in a second area of the display, the second map being a georeferenced map that displays at least a portion of an identical geographic region displayed in the raster map;

receiving a first point on the first map;

receiving a corresponding first point on the second map;

receiving a second point on the first map;

receiving a corresponding second point on the second map;

~~annotating a point on the first map;~~

~~annotating a point on the second map;~~

~~wherein the point annotated on the second map corresponds to the point annotated on the first map;~~

~~assigning a geographic coordinate associated with the annotated point on the second map to the annotated point on the first map; and~~

~~repeating annotating a point on the first map, annotating a point on the second map, and assigning a geographic coordinate at least a second time~~

receiving pixel coordinates for the first point on the first map and the second point on the first map;

receiving geographic coordinates for the first point on the second map and the second point on the second map; and

computing a georeferencing function for the first map in accordance with a relationship between the geographic coordinates.

12. (Currently Amended) The computer readable medium of claim 11 wherein the contents of the ~~computer-readable~~ computer readable medium are also capable of verifying that ~~the~~ a point on the first map is correctly matches geographically associated with the a corresponding point on the second map.

13. (Canceled)

14. (Currently Amended) The computer readable medium of claim 11, wherein the contents of the ~~computer-readable~~ computer readable medium are also capable of ~~allowing a user to mark~~ receiving ~~[[a]]~~ an additional point on the first map, ~~the mark on the first map being~~ and automatically ~~annotated~~ marking a corresponding additional point on the second map as calculated by the computed georeferencing function.

15. (Currently Amended) The computer readable medium of claim 11, wherein the contents of the ~~computer-readable~~ computer readable medium are also

capable of ~~providing~~ assigning a longitude and latitude ~~to the~~ for at least one of the first point and the second point on the second map.

16. (Currently Amended) An apparatus for georeferencing a raster map, comprising:

means for displaying a first map in one area of a display, said first map being a digital raster map;

means for displaying a second map in a second area of the display, the second map being a georeferenced map that displays at least a portion of an identical geographic region displayed in the raster map;

means for receiving a first point on the first map;

means for receiving a corresponding first point on the second map;

means for receiving a second point on the first map;

means for receiving a corresponding second point on the second map;

~~means for annotating a point on the first map;~~

~~means for annotating a point on the second map, wherein the point annotated on the second map corresponds to the point annotated on the first map;~~

~~means for assigning a geographic coordinate associated with the annotated point on the second map to the annotated point on the first map; and~~

~~means for repeating annotating a point on the first map, annotating a point on the second map, and assigning a geographic coordinate at least a second time~~

means for receiving pixel coordinates for the first point on the first map and the second point on the first map;

means for receiving geographic coordinates for the first point on the second map
and the second point on the second map; and
means for computing a georeferencing function for the first map in accordance
with a relationship between the geographic coordinates.

17. (Currently Amended) The apparatus of claim 16 further comprising
means for verifying that ~~the~~ a point on the first map is correctly matches geographically
with a corresponding point ~~associated with the point~~ on the second map.

18. (Canceled)

19. (Currently Amended) The apparatus of claim 16 further comprising
means for ~~marking a~~ receiving an additional point on the first map, ~~the point on the first~~
~~map being~~ and automatically ~~annotated~~ marking a corresponding additional point on the
second map as calculated by the computed georeferencing function.

20. (Currently Amended) The apparatus of claim 16 further comprising
means for ~~providing~~ assigning a longitude and latitude to the first point on the first map.

21. (New) The method of claim 1, the method further comprising:
receiving an additional point on the first map;
receiving a corresponding additional point on the second map;
receiving geographic coordinates for the additional point on the second map; and
recomputing the georeferencing function for the first map.

22. (New) The computer readable medium of claim 11 wherein the contents of the computer-readable medium are also capable of assigning geographic coordinates for an additional point received on the first map using the computed georeferencing function.

23. (New) The apparatus of claim 16 further comprising means for assigning geographic coordinates for an additional point received on the first map using the computed georeferencing function.

24. (New) The method of claim 1 further comprising receiving an additional point on the second map and automatically marking a corresponding additional point on the first map as calculated by the computed georeferencing function.

25. (New) A method of georeferencing a raster map, comprising:
displaying a first map in one area of a display, the first map being a digital raster map;

displaying a second map in a second area of the display, the second map being a georeferenced map that displays at least a portion of an identical geographic region displayed in the raster map;

receiving a finite sequence of two or more point-pairs, each point-pair consisting of a point from the first map and a corresponding point from the second map, wherein the point-pairs are chosen such that corresponding points of each point-pair refer to the same geographic location; and

computing, with each additional point-pair received after the first point-pair, a georeferencing function for the first map that expresses a mathematical relationship between pixel coordinates and geographic coordinates of an arbitrary point on the first map.

26. (New) The method of claim 25, wherein receiving a finite sequence of two or more point-pairs ceases once a quality of the computed georeferencing function is determined to be adequate.